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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/586,414	07/19/2006	Rustom S. Kanga	2156-301A	3134
7590		06/21/2007		
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			EXAMINER	
			HAMILTON, CYNTHIA	
			ART UNIT	PAPER NUMBER
			1752	
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			06/21/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/586,414

Applicant(s)

KANGA, RUSTOM S.

Examiner

Cynthia Hamilton

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10/02/2006, 07/19/2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-26 is/are rejected.
- 7) ☒ Claim(s) 18 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 19 July 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 10/02/2006, 07/19/2006
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

1. Applicant's claim for the benefit of a prior-filed application under 35 U.S.C. 119(e) or under 35 U.S.C. 120, 121, or 365(c) is acknowledged. Applicant has not complied with one or more conditions for receiving the benefit of an earlier filing date under 35 U.S.C. 120 or 121 as follows: The reference must include the relationship (i.e., continuation, divisional, or continuation-in-part) of all nonprovisional applications.
2. It is noted that this application appears to claim subject matter disclosed in prior Application No. 10/768,610, filed January 30, 2004. A reference to the prior application must be inserted as the first sentence(s) of the specification of this application or in an application data sheet (37 CFR 1.76), if applicant intends to rely on the filing date of the prior application under 35 U.S.C. 119(e), 120, 121, or 365(c). See 37 CFR 1.78(a). For benefit claims under 35 U.S.C. 120, 121, or 365(c), ***the reference must include the relationship (i.e., continuation, divisional, or continuation-in-part) of all nonprovisional applications.*** If the application is a utility or plant application filed under 35 U.S.C. 111(a) on or after November 29, 2000, the specific reference to the prior application must be submitted during the pendency of the application and within the later of four months from the actual filing date of the application or sixteen months from the filing date of the prior application. If the application is a utility or plant application which entered the national stage from an international application filed on or after November 29, 2000, after compliance with 35 U.S.C. 371, the specific reference must be submitted during the pendency of the application and within the later of four months from the date on which the national stage commenced under 35 U.S.C. 371(b) or (f) or sixteen months from the filing date of the prior application. See 37 CFR 1.78(a)(2)(ii) and (a)(5)(ii). This time period is not

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extendable and a failure to submit the reference required by 35 U.S.C. 119(e) and/or 120, where applicable, within this time period is considered a waiver of any benefit of such prior application(s) under 35 U.S.C. 119(e), 120, 121 and 365(c). A benefit claim filed after the required time period may be accepted if it is accompanied by a grantable petition to accept an unintentionally delayed benefit claim under 35 U.S.C. 119(e), 120, 121 and 365(c). The petition must be accompanied by (1) the reference required by 35 U.S.C. 120 or 119(e) and 37 CFR 1.78(a)(2) or (a)(5) to the prior application (unless previously submitted), (2) a surcharge under 37 CFR 1.17(t), and (3) a statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2) or (a)(5) and the date the claim was filed was unintentional. The Director may require additional information where there is a question whether the delay was unintentional. The petition should be addressed to: Mail Stop Petition, Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

If the reference to the prior application was previously submitted within the time period set forth in 37 CFR 1.78(a), but not in the first sentence(s) of the specification or an application data sheet (ADS) as required by 37 CFR 1.78(a) (e.g., if the reference was submitted in an oath or declaration or the application transmittal letter), and the information concerning the benefit claim was recognized by the Office as shown by its inclusion on the first filing receipt, the petition under 37 CFR 1.78(a) and the surcharge under 37 CFR 1.17(t) are not required. Applicant is still required to submit the reference in compliance with 37 CFR 1.78(a) by filing an amendment to the first sentence(s) of the specification or an ADS. See MPEP § 201.11.

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claim 18 is objected to because of the following informalities: Claim 18 ends with a semicolon instead of a period. Appropriate correction is required.

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claims 2 and 7 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. There is no antecedent basis for "the hollow cylindrical base layer" cited in claims 2 and 7 which depend respectively on claims 1 and 6. What is found is "a hollow cylindrical support layer". There is no mention of "base" before such reference in claims 2 and

7. Claims 1-10, 14 and 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kanga (6,413,699) in view of Fan (5,262,275) and Cushner et al (5,798,019). With respect to claims 1-10, 14 and 26, Kanga teaches applicants' photosensitive printing element and method of making a hollow cylindrical printing sleeve with the exception of the formation of a hollow cylindrical support. However, Kanga discloses as prior art Fan. Fan teaches that a cylinder can be used in col. 11 as a support and Cushner et al teach the formation of Fan systems on cylindrical seamless cylinders. Kanga teaches the need when backflashing the plates such as those of Fan that a substrate of 85-95% absorbing actinic radiation is needed in order to get an even floor formed for good printing. Fan teaches the advantage of avoiding the need for a negative being formed by using the ablatable coverlayers. Cushner et al teaches the formation of seamless printing cylinders to avoid the bumps formed when solid plates are adhered to cylinders

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to form an accurate surface. With respect to applicants' claims 1-10, 14 and 26, the formation of the plates of KANGA into the seamless cylinder of CUSHNER et al using the ablatable materials of FAN (1) in order to avoid all the unnecessary steps involved in forming a negative for imaging the photopolymerizable layer and (2) to obtain a more perfect printed image without a bump would have been obvious to one of ordinary skill in the art. In Fan, see particularly col. 2, 10, and 11. in Cushner et al, see particularly col. 16-17, 21-22. In Kanga, see particularly the abstract, The Field of the invention, the paragraph bridging col. 1-2, col. 2, lines 49 to col. 3, lines 46, col. 6, lines 27- col. 7, lines 30. In Kanga, see particularly Abstract, The Field of the Invention, the paragraph bridging column 1 and 2, column 2, line 49, to column 3, line 46, column 6, line 27 to column 7, line 30, column 6, lines 15 - 50, columns 2 - 3.

7. Claim 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kanga (6,413,699) in view of Fan (5,262,275) and Cushner et al (5,798,019) as applied to claim 6 above, and further in view of Gush et al (3,619,601) and Weber (3,615,450) and Gelbart (6,180,325) and Ohba et al (6,664,999). The imaging of relief plates with collimated light sources is well known in the relief printing plate art in order to form a finer image. Weber teaches the use of such for this reason. In Weber, see particularly col. 11, line 23-26, col. 13, lines 35-41, col. 14, lines 7-62. Gush teaches the use of collimated light col. 5. Gelbart teaches using a reflector to collimate the exposure light in col. 1, lines 41-53 and col. 2, lines 49-col. 3, lines 17 and Fig. 2, number 37. Ohba et al teach using collimator lens to image a printing plate on a cylinder in the abstract, and summary of the invention. Thus, with respect to claim 11, in order to obtain finer images and to avoid light scatter, the use of a collimated light source to

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image the cylinders set forth in the above paragraph with regard to Kanga, Fan and Cushner et al would have been prima facie obvious.

8. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kanga (6,413,699) in view of Fan (5,262,275) and Cushner et al (5,798,019) as applied to claim 6 above, and further in view of Kitamura et al (4,868,090). There is no disclosure in Kanga, Fan or Cushner et al to exposing the entire surface of the photosensitive printing element to actinic radiation at one time. However, such is known in the art as taught by Kitamura et al in col. 11 lines 3-42. With respect to instant claim 12 the use of such a quick exposure instead of a scanning exposure would have been prima facie obvious to save time in imaging the surface of the cylinder.

9. Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kanga (6,413,699) in view of Fan (5,262,275) and Cushner et al (5,798,019) as applied to claim 6 above, and further in view of Kitamura et al (4,868,090) as applied to claim 12 above, and further in view of Plambeck, Jr. (2,791,504) and Ferree et al (1,986,052). The combination of Kanga, Fan and Cushner et al in view of Kitamura et al do not teach the use of the collimators having first and second opposing major faces and comprising at least one cell that extends from the first major face to the second major face, wherein at least one surface substantially absorbs actinic radiation incident upon the surface and actinic radiation passes through the collimator before reaching the photopolymerizable printing sleeve. However, Plambeck Jr. taught that if lines formed were broadened excessively because of their fineness then the use of a light controlling baffle, e.g. an egg-crate baffle, could be used to eliminate those rays below the minimum desired angle. In Plambeck, jr., see particularly col. 4, lines 57-69. An egg crate

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baffle is as described by Ferree et al in Fig 6, a device for eliminating the glare and having intersecting baffle plates parallel to the focal axis and preferably of considerable width. The baffle plates preferably have dull finished surfaces, i.e. non light reflecting surfaces. Thus, with respect to the desire to obtain a finer image in the formation of relief plates then the use of a device such as the egg crate baffle taught by Plambeck to control the angle of light, i.e. collimate the light, in imaging the cylinders of Fan and Kushner would have been prima facie obvious.

10. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kanga (6,413,699) in view of Fan (5,262,275) and Kushner et al (5,798,019) as applied to claim 14 above, and further in view of Plambeck, Jr. (2,791,504) and Ferree et al (1,986,052). As to the methods and plates set forth by the combination of Fan, Kanga and Kushner et al above, the use of a collimated light source is not taught. However, Plambeck Jr. taught that if lines formed were broadened excessively because of their fineness then the use of a light controlling baffle, e.g. an egg-crate baffle, could be used to eliminate those rays below the minimum desired angle. In Plambeck, jr., see particularly col. 4, lines 57-69. An egg crate baffle is as described by Ferree et al in Fig 6, a device for eliminating the glare and having intersecting baffle plates parallel to the focal axis and preferably of considerable width. The baffle plates preferably have dull finished surfaces, i.e. non light reflecting surfaces. Thus, with respect to the desire to obtain a finer image in the formation of relief plates then the use of a device such as the egg crate baffle taught by Plambeck to control the angle of light, i.e. collimate the light, in imaging the cylinders of Fan and Kushner would have been prima facie obvious.

11. Claims 16-17, 21-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fan (5,262,275) in view of Kushner et al (5,798,019). further in view of Plambeck, Jr. (2,791,504) and

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Ferree et al (1,986,052). Fan teaches that a cylinder can be used in col. 11 as a support and Cushner et al teach the formation of Fan systems on cylindrical seamless cylinders. Cushner et al teaches the formation of seamless printing cylinders to avoid the bumps formed when solid plates are adhered to cylinders to form an arcuate surface. What is not taught within Fan and Cushner is the use of a collimated light source for exposing the photopolymerizable layer. However, Plambeck Jr. taught that if lines formed were broadened excessively because of their fineness then the use of a light controlling baffle, e.g. an egg-crate baffle, could be used to eliminate those rays below the minimum desired angle. In Plambeck, jr., see particularly col. 4, lines 57-69. An egg crate baffle is described by Ferree et al in Fig 6, a device for eliminating the glare and having intersecting baffle plates parallel to the focal axis and preferably of considerable width. The baffle plates preferably have dull finished surfaces, i.e. non light reflecting surfaces. Thus, with respect to the desire to obtain a finer image in the formation of relief plates then the use of a device such as the egg crate baffle taught by Plambeck to control the angle of light, i.e. collimate the light, in imaging the cylinders of Fan and Kushner would have been prima facie obvious.

12. Claims 17-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Fan (5,262,275) in view of Cushner et al (5,798,019). further in view of Plambeck, Jr. (2,791,504) and Ferree et al (1,986,052) as applied to claim 16 above, and further in view of Kanga (6,413,699). The methods made obvious by Fan and Cushner et al in view of Plambeck, Jr and Ferree et al do not disclose the use of a substrate with 85-95 percent blocked light for back exposure for forming a floor. However, Kanga teaches such a support with materials like that of Fan in order to obtain a more even floor and thus better printed images. In Kanga et al, see particularly the Abstract,

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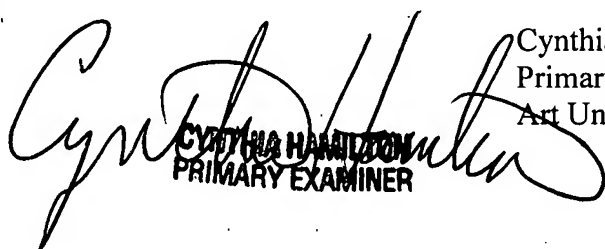
col. 2 and 3, and col. 6. lines 15-50. Thus, with respect to instant claims 17-20, the use of such supports as those of Kanga with the methods of Fan using collimated light with an egg crate baffle as needed as taught by Plambeck for fine imaging would have been prima facie obvious to obtain better printed images because of a more even floor being formed by backflash exposure. With respect to applicants' claims 17-20, the use of the supports of KANGA as the support of FAN while using collimated light with an egg crate baffle as needed for fine line imaging would have been obvious to workers of ordinary skill in the printing plate formation industry to obtain finer printed images by the formation of a more even floor being formed upon backflash exposure due to the blocked light substrate of KANGA being present.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Cynthia Hamilton whose telephone number is 571-272-1331. The examiner can normally be reached on Monday through Friday 9:30 am to 5:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cynthia H. Kelly can be reached on (571) 272-0729. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

June 19, 2007


Cynthia Hamilton
Primary Examiner
Art Unit 1752
CYNTHIA HAMILTON
PRIMARY EXAMINER